

# PATENT COOPERATION TREATY

# PCT

## INTERNATIONAL PRELIMINARY REPORT ON PATENTABILITY

(Chapter I of the Patent Cooperation Treaty)

(PCT Rule 44bis)

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| Applicant's or agent's file reference<br>069547.0370   | <b>FOR FURTHER ACTION</b>  | See item 4 below   |
| International application No.<br>PCT/US2006/030638   | International filing date ( <i>day/month/year</i> )<br>04 August 2006 (04.08.2006) | Priority date ( <i>day/month/year</i> )<br>05 August 2005 (05.08.2005) |
| International Patent Classification (8th edition unless older edition indicated)<br>See relevant information in Form PCT/ISA/237 |  |  |
| Applicant<br>ESPEED, INC.  |  |  |

|                                     |  |   |           |                     |                          |            |          |                          |             |  |                          |            |                            |                                     |           |   |                          |            |                         |                          |             |  |                          |              |   |
|-------------------------------------|--|---|-----------|---------------------|--------------------------|------------|----------|--------------------------|-------------|--|--------------------------|------------|----------------------------|-------------------------------------|-----------|---|--------------------------|------------|-------------------------|--------------------------|-------------|--|--------------------------|--------------|---|
| 1.                                  | This international preliminary report on patentability (Chapter I) is issued by the International Bureau on behalf of the International Searching Authority under Rule 44 <i>bis</i> .1(a).  |   |           |                     |                          |            |          |                          |             |  |                          |            |                            |                                     |           |   |                          |            |                         |                          |             |  |                          |              |   |
| 2.                                  | This REPORT consists of a total of 5 sheets, including this cover sheet.<br><br>In the attached sheets, any reference to the written opinion of the International Searching Authority should be read as a reference to the international preliminary report on patentability (Chapter I) instead.  |   |           |                     |                          |            |          |                          |             |  |                          |            |                            |                                     |           |   |                          |            |                         |                          |             |  |                          |              |   |
| 3.                                  | <p>This report contains indications relating to the following items:</p> <table style="width: 100%;"> <tr> <td style="width: 10%; text-align: center;"><input checked="" type="checkbox"/></td> <td style="width: 30%;">Box No. I</td> <td style="width: 60%;">Basis of the report</td> </tr> <tr> <td style="text-align: center;"><input type="checkbox"/></td> <td>Box No. II</td> <td>Priority</td> </tr> <tr> <td style="text-align: center;"><input type="checkbox"/></td> <td>Box No. III</td> <td>Non-establishment of opinion with regard to novelty, inventive step and industrial applicability</td> </tr> <tr> <td style="text-align: center;"><input type="checkbox"/></td> <td>Box No. IV</td> <td>Lack of unity of invention</td> </tr> <tr> <td style="text-align: center;"><input checked="" type="checkbox"/></td> <td>Box No. V</td> <td>Reasoned statement under Article 35(2) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement</td> </tr> <tr> <td style="text-align: center;"><input type="checkbox"/></td> <td>Box No. VI</td> <td>Certain documents cited</td> </tr> <tr> <td style="text-align: center;"><input type="checkbox"/></td> <td>Box No. VII</td> <td>Certain defects in the international application</td> </tr> <tr> <td style="text-align: center;"><input type="checkbox"/></td> <td>Box No. VIII</td> <td>Certain observations on the international application</td> </tr> </table> | <input checked="" type="checkbox"/>   | Box No. I | Basis of the report | <input type="checkbox"/> | Box No. II | Priority | <input type="checkbox"/> | Box No. III | Non-establishment of opinion with regard to novelty, inventive step and industrial applicability | <input type="checkbox"/> | Box No. IV | Lack of unity of invention | <input checked="" type="checkbox"/> | Box No. V | Reasoned statement under Article 35(2) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement | <input type="checkbox"/> | Box No. VI | Certain documents cited | <input type="checkbox"/> | Box No. VII | Certain defects in the international application | <input type="checkbox"/> | Box No. VIII | Certain observations on the international application |
| <input checked="" type="checkbox"/> | Box No. I  | Basis of the report   |           |                     |                          |            |          |                          |             |  |                          |            |                            |                                     |           |   |                          |            |                         |                          |             |  |                          |              |   |
| <input type="checkbox"/>            | Box No. II   | Priority  |           |                     |                          |            |          |                          |             |  |                          |            |                            |                                     |           |   |                          |            |                         |                          |             |  |                          |              |   |
| <input type="checkbox"/>            | Box No. III  | Non-establishment of opinion with regard to novelty, inventive step and industrial applicability  |           |                     |                          |            |          |                          |             |  |                          |            |                            |                                     |           |   |                          |            |                         |                          |             |  |                          |              |   |
| <input type="checkbox"/>            | Box No. IV   | Lack of unity of invention  |           |                     |                          |            |          |                          |             |  |                          |            |                            |                                     |           |   |                          |            |                         |                          |             |  |                          |              |   |
| <input checked="" type="checkbox"/> | Box No. V  | Reasoned statement under Article 35(2) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement |           |                     |                          |            |          |                          |             |  |                          |            |                            |                                     |           |   |                          |            |                         |                          |             |  |                          |              |   |
| <input type="checkbox"/>            | Box No. VI   | Certain documents cited   |           |                     |                          |            |          |                          |             |  |                          |            |                            |                                     |           |   |                          |            |                         |                          |             |  |                          |              |   |
| <input type="checkbox"/>            | Box No. VII  | Certain defects in the international application  |           |                     |                          |            |          |                          |             |  |                          |            |                            |                                     |           |   |                          |            |                         |                          |             |  |                          |              |   |
| <input type="checkbox"/>            | Box No. VIII   | Certain observations on the international application   |           |                     |                          |            |          |                          |             |  |                          |            |                            |                                     |           |   |                          |            |                         |                          |             |  |                          |              |   |
| 4.                                  | The International Bureau will communicate this report to designated Offices in accordance with Rules 44bis.3(c) and 93bis.1 but not, except where the applicant makes an express request under Article 23(2), before the expiration of 30 months from the priority date (Rule 44bis .2).   |   |           |                     |                          |            |          |                          |             |  |                          |            |                            |                                     |           |   |                          |            |                         |                          |             |  |                          |              |   |

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|---|--|
| The International Bureau of WIPO<br>34, chemin des Colombettes<br>1211 Geneva 20, Switzerland | Date of issuance of this report<br>05 February 2008 (05.02.2008)   |
| Facsimile No. +41 22 338 82 70  | Authorized officer<br><br><div style="text-align: center; font-weight: bold; font-size: 1.2em;">Nora Lindner</div> |
| e-mail: pt02.pct@wipo.int   |  |

# PATENT COOPERATION TREATY

From the  
INTERNATIONAL SEARCHING AUTHORITY

To: Samir A. Bhavsar  
Baker Botts LLP  
2001 Ross Avenue  
Dallas, Texas 75201

# PCT

WRITTEN OPINION OF THE  
INTERNATIONAL SEARCHING AUTHORITY

(PCT Rule 43bis.1)

|   |  |  |
|---|--|--|
| Applicant's or agent's file reference<br><b>069547.0370</b>   |  | Date of mailing<br>(day/month/year) <b>20 APR 2007</b> |
| International application No.<br><b>PCT/US 06/30638</b>   |  | <b>FOR FURTHER ACTION</b><br>See paragraph 2 below     |
| International filing date (day/month/year)<br><b>04 August 2006 (04.08.2006)</b>  | Priority date (day/month/year)<br><b>05 August 2005 (05.08.2005)</b> |  |
| International Patent Classification (IPC) or both national classification and IPC<br><b>IPC(8) - G06Q 40/00 (2007.01)</b><br><b>USPC - 705/37</b> |  |  |
| Applicant <b>ESPEED, INC.</b>   |  |  |

**1. This opinion contains indications relating to the following items:**

- ☒ Box No. I Basis of the opinion
- ☐ Box No. II Priority
- ☐ Box No. III Non-establishment of opinion with regard to novelty, inventive step and industrial applicability
- ☐ Box No. IV Lack of unity of invention
- ☒ Box No. V Reasoned statement under Rule 43bis.1(a)(i) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement
- ☐ Box No. VI Certain documents cited
- ☐ Box No. VII Certain defects in the international application
- ☐ Box No. VIII Certain observations on the international application

**2. FURTHER ACTION**

If a demand for international preliminary examination is made, this opinion will be considered to be a written opinion of the International Preliminary Examining Authority ("IPEA") except that this does not apply where the applicant chooses an Authority other than this one to be the IPEA and the chosen IPEA has notified the International Bureau under Rule 66.1bis(b) that written opinions of this International Searching Authority will not be so considered.

If this opinion is, as provided above, considered to be a written opinion of the IPEA, the applicant is invited to submit to the IPEA a written reply together, where appropriate, with amendments, before the expiration of 3 months from the date of mailing of Form PCT/ISA/220 or before the expiration of 22 months from the priority date, whichever expires later.

For further options, see Form PCT/ISA/220.

**3. For further details, see notes to Form PCT/ISA/220.**

|   |  |   |
|---|--|---|
| Name and mailing address of the ISA/US<br>Mail Stop PCT, Attn: ISA/US<br>Commissioner for Patents<br>P.O. Box 1450, Alexandria, Virginia 22313-1450<br>Facsimile No. 571-273-3201 | Date of completion of this opinion<br><br><b>19 February 2007 (19.02.2007)</b> | Authorized officer:<br><br><b>Lee W. Young</b><br><br><small>PCT Helpdesk: 571-272-4300<br/>PCT OSP: 571-272-7774</small> |
|---|--|---|

**WRITTEN OPINION OF THE  
INTERNATIONAL SEARCHING AUTHORITY**

International application No.

PCT/US 06/30638

**Box No. I      Basis of this opinion**

1. With regard to the language, this opinion has been established on the basis of:  
☒ the international application in the language in which it was filed  
☐ a translation of the international application into \_\_\_\_\_, which is the language of a translation furnished for the purposes of international search (Rules 12.3(a) and 23.1(b)).
2. With regard to any nucleotide and/or amino acid sequence disclosed in the international application and necessary to the claimed invention, this opinion has been established on the basis of:
  - a. type of material  
☐ a sequence listing  
☐ table(s) related to the sequence listing
  - b. format of material  
☐ on paper  
☐ in electronic form
  - c. time of filing/furnishing  
☐ contained in the international application as filed  
☐ filed together with the international application in electronic form  
☐ furnished subsequently to this Authority for the purposes of search
3. ☐ In addition, in the case that more than one version or copy of a sequence listing and/or table(s) relating thereto has been filed or furnished, the required statements that the information in the subsequent or additional copies is identical to that in the application as filed or does not go beyond the application as filed, as appropriate, were furnished.
4. Additional comments:

**WRITTEN OPINION OF THE  
INTERNATIONAL SEARCHING AUTHORITY**

International application No.

PCT/US 06/30638

**Box No. V Reasoned statement under Rule 43bis.1(a)(i) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement**

**1. Statement**

|                               |        |      |     |
|-------------------------------|--------|------|-----|
| Novelty (N)                   | Claims | 1-27 | YES |
|                               | Claims | None | NO  |
| Inventive step (IS)           | Claims | None | YES |
|                               | Claims | 1-27 | NO  |
| Industrial applicability (IA) | Claims | 1-27 | YES |
|                               | Claims | None | NO  |

**2. Citations and explanations:**

Claims 1-27 lack an inventive step under PCT Article 33(2) as being obvious over US 2004/0143538 A1 to Korhammer et al. (hereinafter 'Korhammer') in view of US 2005/0055304 A1 to Lutnick et al. (hereinafter 'Lutnick').

As per claims 1, 10 and 19, Korhammer discloses a system, method and logic for managing trading orders, comprising a memory operable to store a first trading order for a particular trading product comprising a displayed portion and reserve portion received from a first trader (an order for a first financial instrument of the plurality of financial instruments is received from a first user, the order includes a first price per unit component, and a first unit quantity, the first unit quantity includes a disclosed liquidity quantity and an undisclosed liquidity quantity, see para [0016]); and a second trading order associated with the particular trading product comprising a display portion and a reserve portion received from a second trader (plurality of one or more users transmitting undisclosed liquidity values of received orders, see para [0030]); a processor communicatively coupled to the memory and operable to: receive from a counterparty trader a counterorder for the trading product (a reciprocal order for the first financial instrument, see para [0017]); using the counterorder to fill the display portion of the first trading order with a corresponding portion of the counterorder; using the counterorder to fill the display portion of the second trading order with a corresponding portion of the counterorder after filling the display portion of the second trading order (if the target one of the trade execution entities is the first one of the trade execution entities, the method sends a second sub-order, including the first price per unit component and a second disclosed liquidity quantity equal to at least a portion of the undisclosed liquidity quantity to the target one of the trade execution entities; and then sends the reciprocal order to the target one of the trade execution entities, see para [0031]); offering at least a portion of the counterorder to the first trader (as a function of (1) the price per unit value and the disclosed liquidity quantity for the first financial instrument in the updated order book information, and (2) the first price per unit component and the first undisclosed liquidity quantity, the reciprocal order is sent to one of the plurality of trade execution entities, see para [0018]). Korhammer does not specifically teach the processor exclusively offering at least a portion off the counterorder to the first trader for a configurable period of time after filling the display portion of the second trading order. Lutnick teaches exclusive trading privileges extended to a trader and a counterparty trader (para [0039]). One skilled in the art would find it obvious to combine Korhammer and Lutnick, as both references teach trades offered to counterparties. Further, one skilled in the art would be motivated to make such combination as exclusively offering at least a portion off the counterorder to the first trader for a configurable period of time following filling the second trade order would be obvious as a portion of the counterorder remains unfilled. Therefore, one would be motivated to fill the counterorder at an acceptable price, where exclusive offers would promote trade and increase liquidity.

As per claims 2, 11 and 20, Korhammer further discloses wherein the first and second trading orders are bids (buy order (or bid), see para [0053]) and the counterorder is a hit (initiated a reciprocal (i.e., opposing), see para [0021], [0071] and claim 3).

As per claims 3, 12 and 21, Korhammer further discloses wherein the first and second trading orders are offers (an ECN sell order, see para [0071]) and the counterorder is a take (initiated a reciprocal (i.e., opposing), see para [0071] and claim 3).

As per claims 4, 13 and 22, Korhammer discloses the display portion of the first trading order to a plurality of traders and prevents the reserve portion of the first trading order from being disclosed to the plurality of traders (as a function of (1) the price per unit value and the disclosed liquidity quantity for the first financial instrument in the updated order book information, and (2) the first price per unit component and the first undisclosed liquidity quantity, the reciprocal order is sent to one of the plurality of trade execution entities, see para [0018] and Fig 3).

As per claims 5, 14 and 23, Korhammer discloses using the counterorder to fill the display portion of the first trading order comprises satisfying the display portion of the first trading order with a corresponding portion of the counterorder (for each selected bid, a corresponding order specifying the selected order quantity is sent to one of the plurality of trading entities (see para [0024]).

--Please See Continuation Sheet

WRITTEN OPINION OF THE  
INTERNATIONAL SEARCHING AUTHORITY

International application No.

PCT/US 06/30638

Supplemental Box

In case the space in any of the preceding boxes is not sufficient.

Continuation of:

v. 2 Citations and explanations

As per claim 6, 15 and 24, Korhammer discloses offering at least a portion of the counterorder to the first trader comprises offering the at least a portion of the counterorder to the first trader as provided previously with respect to claims 5, 14 and 23. Kornhammer does not specifically teach that the processor exclusively offering the counterorder to the first trader without offering any portion of the counterorder to the second trader until at least the configurable period of time expires. However, Lutnick teaches exclusive trading privileges as provided previously with respect to claims 1, 10 and 19. Exclusively offering at least a portion off the counterorder to the first trader for a configurable period of time following filling the second trade order would be obvious to one of ordinary skill in the art because an exclusive offer promotes trade and increases liquidity.

As per claims 7, 16 and 25, Korhammer discloses, after filling the display portion of the second trading order and prior to exclusively offering at least part of the counteroffer, using the counterorder to fill the reserve portion of the first trading order (the system considers undisclosed liquidity which is being maintained in CCS 100 when routing a reciprocal order that can access multiple trade execution entities, see para [0091])

As per claims 8, 17 and 26, Korhammer discloses, after filling the display portion of the second trading order and prior to exclusively offering at least part of the counteroffer, using the counterorder to fill the reserve portion of the first trading order; and using the counterorder to fill the reserve portion of the second trading order (the system considers undisclosed liquidity which is being maintained in CCS 100 when routing a reciprocal order that can access multiple trade execution entities, see para [0091])

As per claims 9, 18 and 27, neither Korhammer nor Lutnick specifically disclose a system wherein the processor is further operable to, if the first trader accepts the first portion of the counterorder during the configurable period, extend the configurable period; and exclusively offer a second portion of the counterorder to the first trader for the extended configurable period. However, extending the configurable period and exclusively offering a second portion off the counterorder to the first trader would have been obvious to one of ordinary skill in the art because an exclusive sell offer promotes trade and increases liquidity.

Claims 1-27 have industrial applicability as defined by PCT Article 33(4) because the subject matter can be made or used in industry.